# **White Paper Report**

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Project Director: Janet Spitz (jspitz@bpl.org)

Institution: Norman B. Leventhal Map Center, Inc.

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### Cover Page

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Project Title: Planning a Central Cartographic Web Portal for the Revolutionary War Era,

1750-1800

Project Director: Janet Spitz

Grantee: Norman B. Leventhal Map Center, Inc.

Date: March 27, 2015

# NORMAN B. LEVENTHAL MAP CENTER Central Cartographic Web Portal Project

National Endowment for the Humanities "Foundations" Grant Grant #PW-51334-13 White Paper March 30, 2015

#### **PROJECT ACTIVITIES**

In May 2013, with the support of a "Foundations" grant from the National Endowment for the Humanities, the Norman B. Leventhal Map Center (LMC) at the Boston Public Library (BPL) embarked upon the planning phase for expansion of an already successful website to create a Central Cartographic Web Portal focusing on the American Revolutionary War Era. This curated digital collection is being designed to provide broad access to primary source documents that includes a judicious and thoughtful selection of the best and most informative printed and manuscript maps from collections in the United States and Europe.

This initiative is based on the strength of Leventhal Map Center's collection pertaining to the American Revolutionary Era, broadly defined as 1750-1800. These materials focus on **military mapping** (campaign and battlefield maps showing military engagements and troop movements in the New England and Mid-Atlantic colonies); 18<sup>th</sup> century **maritime charts** of the American coast which guided trade and the movement of troops; and **urban mapping** (emphasizing the physical growth of Boston and its economic and political ties to surrounding communities). Boston is also uniquely qualified as a resource for the American Revolutionary War Era, as the starting point for this path to freedom, and the foundation for our country's history and the reflection of this rich legacy on the international landscape 250 years ago and the impact this has in America's ever changing face, even today.

During the two year planning grant period, LMC has grown this resource from 900 of its own stellar offerings to more than 1,300 maps and atlases now available online from this era, with future growth numbering up to 3,500-4,000. To complement our own strengths, the Central Cartographic Web Portal currently includes digitized maps from six other leading collections including the Library of Congress, Harvard Map Collection, Richard H. Brown Collection, New York Public Library, Boston Athenaeum and the American Antiquarian Society. Six additional partners will be completed during 2015, including: the William L. Clements Library at the University of Michigan, John Carter Brown Library, Brown University, the British Library, Colonial Williamsburg, Massachusetts Historical Society, and the Newberry Library. We established standards for cataloging and digitizing, and developed a comprehensive work plan to complete the project.

The theme of the American Revolutionary War Era is serving as a pilot of focused content and model for additional themes in future years. The digital collection will provide evidence of how the colonists effected more than a political revolution, but a cultural revolution manifested in part by developing their own cartography of the new nation and individual states. It will provide improved access to vastly expanded and rich resources through technology; advancing the scholarly, educational and cultural enrichment missions of all participating institutions.

#### **ACCOMPLISHMENTS**

Our planning project was designed to incorporate the guidance of humanities experts and thorough review of collections locally, nationally and internationally for inclusion in the Portal. The tasks and deliverables completed during the grant period follow.

1. Two Advisory Planning Teams will be formed – one comprised of curators and humanities experts; the other technological support for cataloging & data management.

The first step in implementing the "Foundations" grant from the National Endowment for the Humanities was to organize and convene a two-day Forum for curatorial and technical experts to begin planning for expansion of our Central Web Portal for Historic Maps from the Revolutionary War Era, 1750-1800. Originally conceived as two separate working groups, we determined early on in the Forum planning phase that combining the curatorial and technical experts would yield the best results, and that it was essential that curatorial and technical experts needed to learn about each other's expertise and hear what everyone was contributing to the process. The Forum was a success in creating extensive dialogue among the participants about criteria for the maps to be included in the Portal, the general terms of the agreement between Leventhal Map Center and partners, criteria for metadata, and the scope and potential of the Portal. This collaborative feature very early on in the planning phase was vitally important to the development of our partnerships and the creation of a bond of trust amongst all participants.

2. The two teams will meet on-site in Boston at the initiation of the project, followed by teleconferences throughout the year with finite subsets of the group.

In September 2013 we convened a two-day forum (September 11 and 12) to begin the expansion of our Central Web Portal. The Forum was attended by thirty-three curators, catalogers, technical staff, and Board members from the British Library, Newberry Library, John Carter Brown Library, William Clements Library, New York Public Library, Harvard Map Collection, American Antiquarian Society, Massachusetts Historical Society, Boston Athenaeum, Leventhal Map Center and Boston Public Library. The curators reported on the relevant content of their collections, while technical experts, who work with matters of cataloging, digitizing and website development reported on current and best practices and standards. (See Appendix I).

The goal of this two-day meeting was to discuss the parameters of the project, including an introduction to the concept of the Central Web Portal, a report on our progress thus far, reports on the unique aspects of individual institutional collections, discussion of metadata and digitizing standards, sharing of ideas about the thematic and curatorial organization of the web portal, and criteria for legal agreements of sharing images. Each curatorial representative provided an overview of their collection and the specialized maps and atlases they owned, while Digital Lab personnel reviewed policies and procedures, and best practice for ingesting digital data into the Portal. Although working in the same or related fields, participants learned about landmark maps and atlases from various collections, quantities of maps available, and specific atlases owned. Everyone agreed this was a stimulating aspect of the Forum, with enthusiasm generated for the project and wealth of information and resources available within the group. The Chairman of LMC's Board of Directors reviewed the legal ramifications associated with the agreements to be drawn up reflecting usage rights and the benefits to both lenders and LMC. In general, the participants were very appreciative of the material presented during the forum and universally expressed enthusiasm about participating in the project.

The LMC Curator, other staff and a contracted specialist then researched relevant published cartobibliographies and websites and/or made onsite visits to the various collections in order to select relevant maps, develop a database to track selected images, and determine costs for digitizing for

institutions without existing programs. The Executive Director negotiated agreements for image use on the Portal. The end result was the establishment of criteria for map selection, general terms of partner agreements, criteria for metadata and transfer of information, and scope of Portal for Theme 1 – American Revolutionary War era.

One important outgrowth of the Forum has been a working group that meets regularly to discuss specific details of the Portal design and functions, including:

- Bonnie Burns, Librarian for Geographic Information Services, Harvard Map Collection
- Paul Cote, Geographic Information Specialist. Member of LMC Board of Review
- *William Fowler*, Professor of History, Northeastern University (teaches Digital Humanities class), and former Director of Massachusetts Historical Society, and LMC Board member
- Eben English, Web Services Developer at Boston Public Library
- **Evan Thornberry**, LMC Cartographic Reference and Preservation Librarian, completing georeferencing and technical expertise

On a parallel track, curators from participating institutions and individuals with technical expertise continue to provide advisory oversight for the Portal. Rather than have subsequent meetings with the curators and humanities scholars in a large group, we have found it to be more beneficial to review details of map selection and curatorial matters individually with participating organizations and specialists. This personal attention better accentuates the independent distinctions of each collection and individual needs and contributions. Additionally, an Education Advisory Committee is reviewing sections specific to their community. The LMC's Board of Directors and Board of Review, a group that includes historians, map experts and scholars, as well as nationally recognized specialists whose expertise ranges from geography and history to visual, political, and economic culture, as well as technology specialists are being consulted during project development. Advisors include, but are not limited to:

- Brian Dunnigan, Associate Director & Curator of Maps, William L. Clements Library, University of Michigan
- James Akerman, Curator of Maps and Director of Hermon Dunlap Smith Center for the History of Cartography, The Newberry Library, Chicago
- **Peter Barber,** Head, Map Library, The British Library
- Richard Brown, Private Collector, New York City; Member of LMC Board of Directors
- Lauren Hewes, Curator of Graphic Arts, American Antiquarian Society, Worcester, MA
- Matthew Knutzen, Geospatial Librarian, Lionel Pincus and Princess Firyal Map Division, NYPL
- Natacha Scott, History and Social Studies Content Specialist, Boston Public Schools
- Elizabeth MacDonald, Literacy and Content Specialist, Boston Public Schools

The team helping with the technical aspects of the process is the Boston Public Library Technology Team, including: **Thomas Blake**, Digital Projects Manager at BPL; **David Leonard**, Director of Administration and Technology, and the Boston Public Library's Chief Technology Officer; **Steven Anderson**, Digital Repository Developer; and **Scot Colford**, Head of Web Services at BPL.

3. Approximately 10 institutions will be identified and consulted about relevant cartographic items from their collections for inclusion in the Portal.

A total of twelve collections have been identified as key program participants. A complete list of partners, with progress to date for each is attached as Appendix II. This includes map selection totals, as

well as status of digitization process, signed agreement, and whether items are currently included on the LMC website.

We envision the Portal as a dynamic entity, with the addition of new maps and atlases, and/or collections over time as travel, resources and study permit. As always, the goal of the Portal is to feature unique maps and atlases that are non-duplicative. We have learned during the planning phase that the commitment on the part of staff to travel and study individual collections is very time intensive. There is a rich cache of additional resources to select from, for example the Huntington Library in San Marino, California, so we will be judicious and thoughtful as we identify and engage future partners.

4. Criteria established for item selection; items reviewed by the Chief Project Curator and relevant Advisory Team members for significance and humanities content relevant to this project, anticipating 1,500 items to be identified for inclusion in the Portal.

In thinking about the cartographic images that we planned to add to the Central Web Portal for the American Revolutionary War era, we did not want to duplicate maps that already existed on the website that were available to us from the Boston Public Library, Mapping Boston Foundation, and Richard Brown collections. Our primary temporal focus was the second half of the 18th century, extending from the French and Indian War through the unrest of the 1760s and the war itself, to the early years of the nation. The geographical focus would be the original thirteen colonies in the context of the British Empire and the Atlantic World at that time. While the primary focus would be Massachusetts and New England, we planned to include materials for the Mid-Atlantic and Southern colonies, as well as the British colonies in Canada and the Caribbean. As research continued, we refined our criteria to limit the selection of landscape views, architectural plans and details, and very localized surveys, such as property maps.

Specific selection criteria for the American Revolutionary War era theme includes:

- *Time Period*: Generally, 1750-1800, with emphasis on core period of 1754-1783, bracketing the beginning of the French and Indian War through the close of the American Revolutionary War.
- Formats: Primarily printed and manuscript maps and charts, with consideration of printed and manuscript fortification plans, and occasionally printed and manuscript landscape or topographical views. No reproductions or facsimiles.
- Geographic Coverage: Primarily the British colonies in North America.

<u>Priority 1</u>: Comprehensive selection of most editions/states of printed maps/fortification plans and most variations of manuscript maps/fortification plans; selection of manuscript landscape or topographical views and cadastral surveys readily available in major collections. Entire time period.

- Massachusetts and Boston: Primary emphasis, comprehensive as possible.
- New England, individual colonies, major cities/towns, and other historically significant localities.

<u>Priority 2</u>: Substantial selection of representative editions/states (first and last) of printed maps/fortification plans and best examples of various versions of manuscript/fortification plans; no landscape or topographic views and no cadastral surveys. Entire time period.

- Maps of entire continent or eastern seaboard, regional maps, and maps of new United States.
- Mid-Atlantic (New York, New Jersey, Pennsylvania, Delaware), individual colonies, major cities/towns, and other historically significant localities.
- South (Chesapeake and Carolinas), individual colonies, major cities/towns, and other historically significant localities.

<u>Priority 3</u>: Representative selection from various editions/states of printed maps/fortification plans and best examples of various versions of manuscript maps/fortification plans, limited to availability in major partnering institutions. No landscape or topographic views and no cadastral surveys. Focus primarily on core time period (1754-1783).

- Canada (Maritime Provinces, Quebec and St. Lawrence River Valley, and Great Lakes), individual provinces, major cities and towns, and other historically significant localities.
- British Colonies in West Indies, individual islands, major cities/towns, and other historically significant localities.

We have already identified more than 2,500 maps to complement our own collection of more than 900 images, as detailed on the Key Partners and Progress to Date Appendix. Many of these collections do not have a regular digitization program, and in some instances LMC had to pay to have their items cataloged and digitized prior to ingest into the Portal. We anticipate a total of 3,500-4,000 maps and atlases related to the American Revolutionary War era theme.

Protocols produced outlining standard cataloguing and digitizing requirements (ex. MARC records for each item, specifications for digitization).

Protocols and standards have been established for cataloging and digitization. Participants have agreed to follow established cataloging and digitization requirements for all items selected for this project. As the Leventhal Map Center Curator works with each institution, cataloging and digitization protocols are checked to see that they meet LMC requirements and allow for the accurate transfer of these records into the online collection. The metadata is transferred on an external hard-drive, or using FTP services. The metadata incorporates current standards, such as cataloging in RDA (Resource, Description & Access). One challenge we have encountered is that our cataloger has had to add additional descriptive and institutional-specific information for many catalog records provided by partners. The staff time required to complete this phase has been nearly twice as much as originally projected, due to the lengthy back and forth with partners. We require image files to be provided in tiff file format, with a dpi number of at least 300. BPL Digital Services processes these large image files for eventual display in the online collection.

#### Standards for cataloging collection items with a full-level MARC bibliographic record

The Leventhal Map Center is an Online Computer Library Center (OCLC) participant, and cataloging is executed at full-level in the MARC format, according to MARC 21 standards. All records are easily searchable by keyword through the BPL's online public access catalog (OPAC). In addition, geographic coordinates are being added to each record so that the digital resources can be used in databases utilizing geospatial information.

Catalog records are created to provide the greatest possible access to each individual map. MARC bibliographic records are full-level, enriched by a cataloger providing subject analysis and access using controlled vocabularies as well as any pertinent local information regarding the unique physical characteristics of the item in hand. A sample cataloging record, as well as standards, guidelines, and vocabularies that have been used in cataloging these cartographic materials are listed in Appendix III.

When partner institution cataloging metadata is received, the Cataloger confirms that a comprehensive MARC (MAchine Readable Cataloging) bibliographic record for each map title has been created. If necessary descriptive metadata is missing, the Cataloger adds that information to ensure a seamless transition into the online collection. Catalog records from other institutions must be formatted for

import into the online collection. Our website can create webpages from bibliographic records in MARC format, the international standard format. Records from most other institutions are in MARC format and are reviewed for accuracy and consistency and then uploaded to the website. The portal uses a different system from the website and ingests data from spreadsheets, which can be generated from MARC records. Data supporting portal features are added to spreadsheets before they are imported into the portal.

One of our partner institutions, the British Library, employed a map cataloger to create bibliographic records for each map selected for the Portal. LMC provided the British Library with a list of necessary bibliographic elements to include in each descriptive record, so that cataloging and transfer of data would be seamless. Both the Boston Public Library/LMC and the British Library are cataloging maps according to RDA (Resource Description and Access). RDA is an updated, 21<sup>st</sup> century set of rules that will replace the outdated Anglo American Cataloging Rules, 2<sup>nd</sup> ed., first published in 1978. By incorporating RDA into cataloging work, the MARC records created as a result are far more accessible to a larger audience, making resources easier to find for all who visit the library's catalog. This is important as we establish standardization of all records. However, the British Library has been the first institution to provide non-MARC data. Maps from the King's Topographical Collection were in MARC, but maps from manuscript collections were cataloged for archives rather than libraries so those records were in a spreadsheet. Converting the spreadsheet to MARC records was complex as the data fields provided did not perfectly map, or transfer, to MARC fields. The resulting MARC records had to be checked and corrected individually.

#### Hardware and Software Equipment

Items are photographed using a vertically-oriented copy configuration. The focal plane of the digital camera device and the plane of the original material are made parallel by the use of fine-geared mounting heads and spirit-level indicators. Once the material is properly positioned and aligned beneath the camera system, a digital image is captured on a 48 megapixel (8000 pixels x 6000 pixels), multi-shot, CCD array manufactured by Sinar. The capture device is capable of producing an image file large enough to reproduce original material up to 20" x 27" @ 300 d.p.i. In most cases, maps are captured in multiple frames which are stitched together in Adobe Photoshop or other image editing software to achieve the proper spatial frequency necessary to fully render the finest level of informational data in the original. An input profile characterizing the response of the imaging configuration (lighting, optics, sensor) is created for each capture session using a Gretag Macbeth Digital Color Checker SG target and Profile Maker software. The image file is processed and saved with an Adobe RGB 1998 embedded color profile. BPL Digital Services staff performs this work. Two types of images files are generated from this process:

- Preservation master: All master image files saved as TIFF files that were created and proofed in a color managed environment and embedded with a large gamut, perceptually uniform colorspace profile (Adobe RGB 1998).
- Access and Thumbnails: Deliverable files are generated from master files in formats (current and developing) compatible with systems that provide the greatest level of accessibility and functionality in a networked environment. JPEG and JPEG2000 implementations currently fulfill this goal. Each master image receives two deliverable files of different sizes for the user, and one thumbnail size image for reference display on the Portal.

#### Metadata

The bibliographic information contained in the MARC records is imported directly to the LMC website from electronic metadata records provided by the partner institutions. These MARC-based descriptions are then converted into MODS (Metadata Object Description Schema) for storage in the BPL digital

object repository. Map images and their associated metadata that are in the Portal online collection are stored in this repository. Metadata in the Portal will be displayed using MODS fields, which provides many more access points to maps than currently available. We are including the widest variety of fields and descriptors to provide the easiest access to the digital content. We will provide access to each author/creator/contributor related to the map and geographic coordinate information, to enable users to search geographically for maps of a general geographic location. Subject access to images is enhanced through utilization of additional tags that are both authoritative and based on vernacular. We are taking advantage of the expressive MODS format to provide relevant bibliographic and descriptive information, providing the greatest and easiest level of access to this digital content.

As included in all agreements, partner institutions will notify LMC of changes or updates to descriptive metadata associated with digital content. LMC staff will then edit metadata as appropriate, to ensure accurate information. The digital object repository system will host digital objects and harvest digital object metadata from other sources, and re-expose collected metadata to other harvesting services. The system will provide the ability to support uniquely branded user interfaces at organizational and institutional level.

6. Development of work plans determining physical location and timing for cataloguing and digitizing (whether outsourced or completed at BPL's Digital Laboratory).

LMC staff has spent considerable time visiting partner collections, meeting with staff and reviewing and selecting maps. Individuals from all partner institutions enthusiastically participated in the kick-off Forum. However, a wide variety of institutional barriers and internal cultures have made subsequent negotiations slow. Some institutions do not have a history of making digitized information available on their website; others are just beginning a digitization program. Negotiations at many levels have been far more time consuming than originally anticipated.

A Gantt chart has been developed to track start and finish dates for gathering the materials to be included in the Web Portal. To help facilitate completion of the identification of maps we engaged James Flatness (retired, Library of Congress) to survey the John Carter Brown Collection and Library of Congress Collection. He identified the manuscript maps from the Revolutionary War period that have been digitized. At the Library of Congress he found 682 manuscript maps for inclusion in the Portal. He established a bibliographic search strategy, searching the LOC online catalog to identify MARC records of maps within the parameters of the project. Mr. Flatness then downloaded relevant MARC records, captured the metadata contained therein, copied the data into an excel spreadsheet and organized the bibliographic information, which was then presented to the Map Center. We will not survey the Library of Congress printed maps until after we have added materials from the other institutions, in order to avoid excessive duplication.

#### 7. Agreements (contracts) outlining usage rights negotiated.

To date from our 12 partners we have nine agreements signed and three in progress. See sample agreement in Appendix IV. Negotiating agreements sometimes took many months. We now fully understand the value of these legal documents, and the importance of establishing parameters with the help of legal advisors. We did not anticipate the time and effort necessary to develop the initial document and to convey the details for sign-off from all partners. Through the introduction of our Board Chair to the law firm of Goodwin Procter, we are grateful to have received pro bono legal work amounting to approximately \$40,000 in value, considerably more than we budgeted for contract development, yet a critically important aspect of the process.

8. Digital preservation plan developed that addresses storage and access for the images on LMC's website to ensure long term sustainability.

Images will be stored in the Boston Public Library's digital object repository, which is maintained by the library's Web Services and Information Technology departments. The repository, which is built on the Fedora Commons platform (http://fedora-commons.org/) serves as the primary digital object management system for BPL and for Digital Commonwealth (https://www.digitalcommonwealth.org/), a statewide digital library providing access to materials from cultural institutions throughout Massachusetts. The repository stores digital objects as well as associated descriptive, technical, and administrative metadata. BPL staff perform regularly scheduled fixity checking of all files in the repository, and the repository servers receive weekly differential backups, with full backups occurring on a monthly basis.

Updates and incorporation of new digital images will take into consideration the latest technological advances in the field and expertise of two in-house web developers. The technology infrastructure at the BPL is in place to support updates, maintenance, and access to the digitized maps. In FY 2007, the Trustees of the Library adopted an Action Plan, approved by the Massachusetts Board of Library Commissioners, underscoring the institution's commitment to sustaining BPL digital initiatives. Since LMC's primary goal is free public access to our entire collection, we are committed to this ongoing digitizing process that brings cartographic materials to the public, virtually as well as physically.

#### **AUDIENCES**

The Central Cartographic Web Portal will be a resource for research communities, teachers, students, scholars, and the general public interested in or studying the historical, geographic, and cultural context of the events that were occurring in North America during the second half of the 18<sup>th</sup> century. The Portal will be a curated, freely available online collection of 3,500-4,000 digital images from one of LMC's own 'Collections of Distinction,' and twelve partner institutions and collections in the United States and United Kingdom that hold outstanding works from this period.

#### **EVALUATION**

Of particular interest for this project is the implementation of new collections and digital images, and technological facets that incorporate the latest functionality for data and end user access and utilization. Incorporated into the work plan during the next, implementation, phase is an opportunity to correct or adjust features and individual aspects of the Portal to ensure the best possible results and functionality. Periodic review during the grant period with both internal and outside specialists, and a Focus Group with end users will ensure the Portal remains dynamic and effective as a humanities resource. During the planning phase, LMC's Strategic Planning Committee has been meeting three times per year to ensure that goals and objectives identified in the approved plan are on track, and if not, what adjustments need to be made, together with a plan to implement changes. Additionally, LMC's Board of Directors meets three times per year and the Board of Review meets annually to review and report on all current and future institutional initiatives. During the implementation phase (beginning May 2015) the Portal Advisory Committee will convene via conference calls, and review and test the beta version. A focus group, subset of the Advisory Committee, will convene for close examination and discussion, offering recommendations for the Portal's final version. Beyond the grant period for the American Revolutionary War era materials, the Leventhal Map Center will continue development of the Central Cartographic Web Portal, adding new collections and themes for widespread access by end users.

#### **CONTINUATION OF THE PROJECT**

With the planning grant successfully completed, we are fully committed to the next phase pf the project, and just received notification of receipt of a \$300,000 grant from National Endowment for the Humanities to undertake implementation of the Portal. This next phase will be comprised of the following tasks and deliverables:

- Convene scholarly, technical and educational advisors to review beta version of Portal, features and applications, for access and use by a broad array of audiences.
- Building on cataloging and digitization standards established during the planning phase, metadata will be accessible, searchable and discoverable through basic and enhanced technological functions to create and manipulate maps using the historic data, enhancing traditional research in the humanities and creating new information.
- Staged implementation/incorporation of sophisticated Portal functionalities and applications
  developed by in-house technical staff and outside developers that includes (but is not limited
  to): a unique graphic look, multi-layered entry points and search functions with filters and
  control variations for end users, georeferenced resources, 'save' features, establishment of
  basemaps and added layers, and persistent URLs for map displays.
- Conservation of atlases published during the second half of the 18<sup>th</sup> century by major European publishers that provide British, French and Spanish perspectives on mapping and the importance of the American colonies within the broader European and Atlantic context.
- Presentations at national conferences by LMC curators and educators to expand knowledge of Portal to the field, highlighting its capabilities and resources.

Beyond providing access to the historic materials, the Portal is designed to incorporate diverse functionalities that build on traditional website design while allowing a myriad of applications such as georeferencing, overlaying and toggling, annotating and editing, and subject-oriented design and search functionality. These sophisticated features will enable users to interface from simple and complex viewpoints, leveraging technology to the maximum extent possible.

#### **LONG TERM IMPACT**

Map scholarship is changing and this project is keeping up with those changes. Maps are considered by researchers in the humanities as more than documentary evidence of place; they tell the story of the map publisher, the consumer, the resident, and movements of people and goods - not just the story of the mapmaker or the land. The Portal will be a 21<sup>st</sup> century solution to access of an international collection of cartographic materials from the American Revolutionary War era that is not currently available. Accessibility of the maps and atlases will be increased through this online public resource, collaborations with academic programs concentrated on georeferencing and geospatial data projects, and educational resources, among others. The Portal is designed to be dynamic, evolving as technology, functions and platforms progress, and new collections are incorporated into the content-rich and user friendly format. It will have wide appeal, providing a resource and improved access to vastly expanded and rich resources through technology, thereby advancing the scholarly, educational and cultural enrichment missions of LMC and all partner institutions.

The Leventhal Map Center will begin to announce publicly the creation of the Central Cartographic Web Portal in tandem with the special exhibition *We are One: Mapping America's Road from Revolution to Independence,* opening in May 2015. A graphic designer has created an icon for the Portal which will be added to LMCs website in the spring of 2015, directing visitors to the Portal partnerships and images. We will continue adding images to the website in the coming months.

Approximately 30 maps in the Portal will be featured in the *We are One* exhibition. We are working with Axis Maps, of Hewitt, Texas, to design and build an interactive touchscreen tool for displaying these maps that allows visitors to: browse maps by category; view text/metadata for each map; control the map through transparency or pan/zoom; view map details including text and images or automatically zoom the map to detail areas; and search for location by address. An online desktop version of the touchscreen tool, and mobile version of the online map will allow visitors to browse, access or share information. The testing of functionality and content of interactive maps and web services, as well as georeferencing features, will offer important information as we continue development of our Central Cartographic Web Portal.

#### **GRANT PRODUCTS**

As a planning "Foundations" grant, no products were developed.

#### **APPENDICES**

- Appendix I --: September 2013 Forum attendees and meeting agenda
- ➤ Appendix II--: List of partner organizations and progress to date
- > Appendix III--: Sample catalog record
- > Appendix IV--: Sample partnership cooperation agreement

Norman B. Leventhal Map Center at the Boston Public Library

**Central Cartographic Web Portal** 

Forum on the American Revolution



Glass Orientation Room, Boston Public Library, September 11 and 12, 2013

This event has been made possible in part by the National Endowment for the Humanities: Exploring the human endeavor

### Norman B. Leventhal Map Center at the Boston Public Library

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# Welcome

Norman B. Leventhal Map Center at the Boston Public Library

# **Central Cartographic Web Portal**

# Forum on the American Revolution

Glass Orientation Room, Boston Public Library, September 11 and 12, 2013



### **Central Cartographic Web Portal**

# **Project Description**

The Norman B. Leventhal Map Center (LMC) at the Boston Public Library (BPL) has been awarded a *Foundations* Grant of \$40,000 from the National Endowment for the Humanities supporting the expansion of its already successful website as it develops a Central Cartographic Web Portal, focusing on the American Revolutionary War Era. This curated database will provide broad access to primary source documents that includes a judicious and thoughtful selection of the best and most informative printed and manuscript maps from collections in the U.S. and Europe.

LMC is uniquely qualified to pilot this initiative because of the strength of its collection pertaining to the American Revolutionary Era, broadly defined as 1750-1800. These materials focus on **military mapping** (campaign and battlefield maps showing military engagements and troop movements in the New England, Mid-Atlantic and Southern colonies); 18<sup>th</sup> century **maritime charts** of the American coast which guided trade and the movement of troops; and **urban mapping** (reflecting the growth of the new nation's cities and towns). Boston is also uniquely qualified as a resource for the American Revolutionary War Era, as the starting point for this path to freedom, and the foundation for our country's history and the reflection of this rich legacy on the international landscape 250 years ago and the impact this has in America's ever changing face, even today.

To date LMC has 900 maps available on-line from this Era, and expects to grow this resource to 2,500-3,000 documents. To complement our own strengths, the Central Cartographic Web Portal will include digitized maps from other leading collections. Agreements have already been developed with the Library of Congress, British Library, and a private collector. During the planning phase, we anticipate developing partnerships with additional institutions including the New York Public Library, William L. Clements Library, John Carter Brown Library, and Newberry Library, as well as several local institutions. The theme of the American Revolutionary War Era will serve as a pilot of focused content and model for additional themes in future years. The digital collection will provide evidence of how the colonists effected more than a political revolution, but a cultural revolution manifested in part by developing their own cartography of the new nation and individual states. It will provide improved access to vastly expanded and rich resources through technology; advancing the scholarly, educational and cultural enrichment missions of all participating institutions.

We anticipate the following tasks to be completed, and deliverables identified, during the grant period, which will be summarized in a written report at the conclusion of the project:

- An Advisory Team will be formed, comprised of curators and humanities experts, as well as other specialists providing technological support for cataloging & data management.
- The entire team will meet on-site in Boston at the initiation of the project, followed by teleconferences throughout the year with finite subsets of the group.
- Approximately 10 institutions will be identified and consulted about relevant cartographic items from their collections for inclusion in the Portal.
- Criteria established for item selection; items reviewed by the Chief Project Curator and relevant Advisory Team members for significance and humanities content relevant to this project, anticipating 1,500 items to be identified for inclusion in the Portal.
- Protocols produced outlining standard cataloging and digitizing requirements (ex. MARC records for each item, required Dpi for digitizing).
- Development of work plans determining physical location and timing for cataloging and digitizing (whether outsourced or completed at BPL's Digital Laboratory).
- Agreements (contracts) outlining usage rights negotiated.
- Digital preservation plan developed that addresses storage and access for the images on LMC's website to ensure long term sustainability.

### **Central Cartographic Web Portal**

### **Selection Criteria**

These initial thoughts about selection criteria for American Revolutionary War era maps were developed after reviewing online digital images on the Library of Congress' American Memory site for Massachusetts and approximately 500 items at the British Library. The materials for which we are primarily interested in acquiring digital images are printed and manuscript maps and fortification plans. Our choice of printed and manuscript landscape views will be much more selective.

Our primary focus will be maps and fortification plans pertaining to the original thirteen colonies from 1750 to 1800. For printed maps, our first selection will be those available from the Boston Public Library, Richard Brown, or Library of Congress. Thus, we will be seeking unique, very rare, or best condition printed maps as well as many relevant manuscript maps held by our other partnering institutions. Since landscape and urban views are marginal to the Map Center's collections, our selection of printed and manuscript views will be limited to Boston and the surrounding area. We are also interested in pre-1750 maps of the Boston/New England area because of their relevance to local history.

Our second priority is maps providing geographical coverage of Atlantic Canada. Because of economic ties and political connections with Boston and Massachusetts, these items will add a significant research component to our website. Our particular emphasis will be printed and manuscript maps and fortification plans for the Maritime Provinces, St. Lawrence River valley, and the Great Lakes, particularly for the period from the beginning of the French and Indian War period through the American Revolution. Again our first selection will be from those items held by the Boston Public Library, Richard Brown, and the Library of Congress. For our other partnering institutions, we will also be interested in acquiring digital images of unique, rare, or best condition printed maps, as well as relevant manuscript materials.

Our third priority will be the West Indies. We will focus on printed maps of those islands that were British possessions, the location of military activity, or connected with New England's maritime trade during the period from the beginning of the French and Indian War through the American Revolution. We will be more selective in the number of manuscript plans that we image for these areas.

# Forum Agenda

### Wednesday, September 11

9:30 a.m. Coffee and Meet & Greet

**10:00 a.m.** Welcome to the Forum and Introductions, Robert Melzer,

Chair, LMC Board of Directors

**10:30 a.m.** Concept of the Central Cartographic Web Portal

Context – Jan Spitz, LMC

Content - Ronald Grim, LMC

**10:50 a.m.** Boston Public Library Partnerships

Digital Public Library of America - Dan Cohen, DPLA

Massachusetts Digital Commonwealth - David

Leonard, BPL

**11:30 a.m.** BREAK

**11:45 a.m.** Other Notable Cartographic Web Portals

**Unbinding the Atlas** – Matthew Knutzen, New York

**Public Library** 

Open GeoPortal – Bonnie Burns, Harvard University

Old Maps Online – Evan Thornberry, LMC

**12:30 p.m.** LUNCH – Provided

**1:30 p.m.** Selection Criteria for C.W.P. Maps – Ronald E. Grim

**1:45 p.m.** Curators Discussion – Description of American Revolution

**Holdings** – Chaired by James Akerman, Newberry Library

**3:15 p.m.** BREAK

**3:30 p.m. – 5:00 p.m.** Scholarship and Interpretation – Chaired by Jan Spitz

**6:00 p.m.** Cocktails and Tour of Norman Leventhal Map Collection

Hosted by Norman Leventhal and Alan Leventhal

@ Beacon Capital Partners – OPTIONAL200 State Street, Boston, MA 02109

**7:30 p.m.** Dinner

@ City Landing - RSVP

200 State Street, Boston, MA 02109

### **Thursday, September 12**

**9:45 a.m.** Coffee

10:00 a.m. Cataloging & Metadata

**BPL Cataloging Practices** – Catherine Willis, BPL

Map Center Cataloging & Metadata – Stephanie Cyr,

LMC

**10:45 a.m.** Digital Imaging Studio & Digital Standards, Tom Blake, BPL

**12:00 p.m.** Partner Agreements, Robert Melzer, LMC

**12:15 p.m.** LUNCH – Provided

1:15 p.m. Remaining Questions and Next Steps – Jan Spitz, LMC

**3:00 p.m.** END

Please join us for a guided tour of the Leventhal Map Center after Thursday's events

### **Forum Attendees**

#### James R. Akerman, Curator of Maps, Newberry Library

Dr. James Akerman is Director of the Hermon Dunlap Smith Center for the History of Cartography at the Newberry Library, a post he has held since 1996, having worked at the Newberry since 1985. He holds a Ph.D. in Geography from Penn State University and is the author of many studies of the social and political aspects of cartography, railroad and road maps, and the history of atlases. He has edited or co-edited four collections of essays in the history of cartography and has curated or co-curated four major exhibits, most recently, "Ptolemy's Geography and Renaissance Mapmakers," and "Maps: Finding Our Place in the World." In 2003 he completed "Historic Maps in K-12 Classrooms," a Web site supported in part by the National Endowment for the Humanities that uses digital images of original maps from the Newberry's collections to teach the geographic dimensions of American history.

#### Janet Atkins, CEO & Founder, Ridgeway Philanthropy

Janet Atkins is a recognized expert in helping families and their charitable entities develop strategic and values-based methods of giving. Among the first in the United States to recognize the need for an organized response to the impact of the \$10 trillion transfer of wealth over the next 30 years, she left her 20 year fundraising career in 1998 to head up an innovative new subsidiary for the Boston based law firm of Goulston & Storrs. As the Founder and CEO of Philanthropic Advisors LLC, she was responsible for \$100 million in annual grantmaking for 25 families. She now leads her own independent firm, Ridgeway Philanthropy. Janet serves on the Norman B. Leventhal Map Center's Board of Directors.

#### Peter Michael Barber, Head of Cartographic and Topographic Materials, British Library

Peter joined British Library in 1975. He worked for the Department of Manuscripts until 1987. Peter became the Deputy Map Librarian 1987, and in 2001 the Head of Map Collections.

#### Tom Blake, Digital Projects Manager, Boston Public Library

Tom Blake has been working at the Boston Public Library as their Digital Projects Manager since 2005. He is currently responsible for the creation of beautiful, versatile, and sustainable digital objects for all BPL digital initiatives. Since 2011, he has managed an LSTA-funded grant project to help digitize collections from across Massachusetts in conjunction with Digital

Commonwealth, a statewide repository service, and as a pilot Service Hub of the Digital Public Library of America. Tom came to the BPL from the Massachusetts Historical Society, where he was involved in several digital projects including the online version of the diaries of John Quincy Adams. He also served as a photographer and imaging specialist for nine years at Boston Photo Imaging and as an archives assistant at the MIT Special Collections and Archives.

Tom holds a BFA in Professional Photographic Illustration from the Rochester Institute of Technology, and an MS in Library and Information Science with a concentration in Archives Management from Simmons College.

#### Richard H. Brown, Board of Directors, Norman B. Leventhal Map Center

Richard is a collector of Revolutionary War era maps and views. He is a member of the Madison Council-Library of Congress, and Councilor of the AAS, Library committee of the New York Historical Society, and serves on the Norman B. Leventhal Map Center's Board of Directors. He is currently co-authoring a book on Revolutionary War era maps.

#### Bonnie Burns, Librarian for the Geographic Information Services, Harvard Map Collection

Bonnie has been working with GIS in the Harvard Map Collection for the past 13 years. She is also heavily involved with the Harvard Geospatial Library and the Open Geoportal project. Before coming to Harvard, Bonnie worked as a GIS specialist for the National Park Service, primarily mapping battlefields of the American Civil War.

#### Dan Cohen, Executive Director, Digital Public Library of America

Until 2013 Dan Cohen was a Professor of History in the Department of History and Art History at George Mason University and the Director of the Roy Rosenzweig Center for History and New Media. His personal research has been in digital humanities, broadly construed: the impact of new media and technology on all aspects of knowledge, from the nature of digitized resources to twenty-first century research techniques and software tools to the changing landscape of communication and publication. Dan is the co-author of *Digital History: A Guide to Gathering, Preserving, and Presenting the Past on the Web*, author of *Equations from God: Pure Mathematics and Victorian Faith*, co-editor of *Hacking the Academy*, and author of *The Ivory Tower and the Open Web*.

#### Michael Colford, Director of Library Services, Boston Public Library

Michael Colford is the Director of Library Services at the Boston Public Library (BPL). If it's library-related, it's part of Michael's division. He oversees the Central Library and all the Branches, Collections Strategy, Technical and Digital Services, Communications, Reference and Instruction, Exhibitions and Programming, Literacy Services, and Youth Services. He is also a convener in the Digital Public Library of America's (DPLA) Audience & Participation Workstream, and a member of the Random House Advisory Board. Michael is very interested in the evolution

of libraries and the publishing industry, particularly in the rise of the e-book and how libraries will become a vital part of the publishing ecosystem. That said, while he loves technology and reading, he has yet to complete an entire e-book, and still brings a physical book wherever he goes.

#### Scot Colford, Web Services Manager, Boston Public Library

Scot Colford has been the Web Services Manager of the Boston Public Library since 2008. Prior to this, he served as Applications Manager for the library and taught technology courses at Simmons College Graduate School of Library and Information Science. Scot has also been the Systems Librarian for Simmons College and has been published in the Bulletin of the American Society for Information Science and Technology and the 2009 anthology More Technology for the Rest of Us: A Second Primer on Computing for the Non-IT Librarian.

# Paul Cote, Geographic Information Systems Specialist, Board of Review, Norman B. Leventhal Map Center

Paul has been a GIS specialist and lecturer at Harvard Graduate School of Design for 19 years. He is now taking a sabbatical year, doing research on technology for digital humanities. Paul also serves on the Board of Review for the Norman B. Leventhal Map Center.

# Susan Danforth, Curator of Maps and Prints; Assistant Librarian for Library Operations, John Carter Brown Library

Peter Drummey, Stephen T. Riley Librarian, Massachusetts Historical Society

# Brian Leigh Dunnigan, Associate Director & Curator of Maps, William L. Clements Library, University of Michigan

Brian serves as the Library's Associate Director and also oversees the Clements Library of extensive collections of maps of the Americas. His particular interests in cartography are manuscript military maps and plans of the 18th and early 19th centuries, town and fortification plans, and the mapping of the Great Lakes. Brian has been with the Clements Library since 1996, serving as Curator of Maps for most of that time but also as Interim Director in 2007-2008 and associate director since July 2010. Previously, for seventeen years, he was Executive Director of Old Fort Niagara, a historic site in New York State. His M.A. degrees are in history and museum practices, and he has written and published on the early history of the Great Lakes, particularly the Detroit, Niagara, and Straits of Mackinac regions.

#### Eben English, Web Services Developer, Boston Public Library

Eben English is librarian and developer who has been working in academic and public libraries for the last 7 years, with a focus on digital collections and data curation.

# Joseph Garver, Librarian for Research Services and Collection Development, Harvard Map Collection

Joseph has been a librarian in the Harvard Map Collection since 1991. Since 2008 he has served as curator of its printed maps and atlases. He has curated numerous exhibitions, including ones on propaganda maps, cartographic curiosities, maps of world's fairs, and, currently, maps of Imperial China. He is the author of *Surveying the Shore: Historic Maps of Coastal Massachusetts*, 1600-1930.

#### Christine Graham-Ward, Visual Materials Cataloger, American Antiquarian Society

American Antiquarian Society Short Bio: Since 2006, Christine has been a cataloger at the American Antiquarian Society. She first cataloged books as part of the North American Imprints Project. Since 2008, she has been the visual materials cataloger, working on projects related to prints, photography, sheet music and maps. She received personal training in map cataloging at the Library of Congress in 2010 and has been cataloging maps since that time. She received her BA in Art History from Framingham State College and is currently working towards an MA in Museum Studies from the Harvard University Extension School.

#### Lauren B. Hewes, Andrew W. Mellon Curator of Graphic Arts, American Antiquarian Society

American Antiquarian Society Short Bio: As the Curator of Graphic Arts at the American Antiquarian Society, Lauren Hewes is in charge of the Society's outstanding collection of prints, maps, photography, broadsides and ephemera. She has written widely on nineteenth-century American printmaking and has organized exhibitions at the Davis Museum at Wellesley College, the New York Historical Society, the Clark Art Institute in Williamstown, Massachusetts, and the Dulwich Picture Gallery in London. Her publications include books and articles on American painting, lithography, photography, engravings and etchings. Most recently she served as coeditor on the Society's bicentennial publication *In Pursuit of a Vision* (2012).

#### Matthew Knutzen, Geospatial Librarian, New York Public Library

Matt Knutzen is the Geospatial Librarian of the Lionel Pincus and Princess Firyal Map Division at the New York Public Library. For the past dozen years, he's overseen this collection of 433,000 maps and 25,000 books and atlases, both building the collection and ensuring its long-term preservation. He works with an array of users, providing context and insight to students, donors and scholars alike. Matt helped establish a new vision for map libraries on the web, through the scaled digitization of historic map collections, creation of innovative tools for public engagement through those maps and by building from them, with the help of the public, new, queriable, databases.

#### David Leonard, Director of Administration/Chief Technology Officer, Boston Public Library

As a division director at the BPL, David oversees the following departments and responsibilities: Facilities, Human Resources and Labor Relations, the Events Office, Information Technology, Web Services, Staff Training, the Metro Boston Library Network, and the Major Projects office His major accomplishments to date include the modernization of IT systems at the BPL, and oversight of the design and construction of the new Map Center space. Prior to the Boston Public Library, David spent 10 years in the IT consulting world holding positions that spanned both business development and technology consulting focused on customers' tactical and strategic business goals.

#### Robert Melzer, Chairman of the Board, Leventhal Map Center

Susan Newbury, Head of Cataloging and Metadata Services, John Carter Brown Library

#### James Reid-Cunnigham, Deputy Director, Boston Athenæum

James Reid-Cunningham is Deputy Director at the Boston Athenæum, and supervises special collections and library and museum services. On the staff since 2003, he previously served as the Athenæum's Chief Conservator and Associate Director for Digital Programs and Preservation. Before joining the Athenæum staff, he was Conservator of the Graduate School of Design, Harvard University. From 2009 to 2013, he served as the Adjunct Lecturer on the History, Technology and Conservation of the Book in the Art Conservation Department, Buffalo State College, Buffalo, N.Y.

#### Adam Strohm, Digital Collections Librarian, Newberry Library

Adam Strohm is the Digital Collections Librarian at the Newberry Library in Chicago. He earned his MSLIS from the University of Illinois Urbana-Champaign in 2009. In his role as Digital Collections Librarian, Adam collaborates with staff across the Library and Research Centers in the development and creation of digital collections and publications that bring the Newberry's rich collections into homes and classrooms around the world. Adam also provides email and in person reference assistance. Prior to joining the Newberry in March 2012, Adam worked in the Digital Collections department at Northwestern University Library.

# Leslie Tobias-Olsen, Manager of Computing and Digital Imaging, John Carter Brown Library, Brown University

#### Catherine Willis, Chief of Technical and Digital Services, Boston Public Library

Catherine Willis is originally from Chicago but spent 12 long winters in upstate NY before coming to BPL in 2002. Catherine is the mother of 2, Grandmother of 8, Great-Grandmother of 2. She received MLS from Syracuse University and is the author of *Boston Public Library*, a pictorial history of BPL in the Images of America series.

#### Brian Woroby, Senior Consultant, Vantage Technology Consulting Group

As Senior Consultant, Vantage Technology Consulting Group, Brian serves as consultant on strategic technology initiatives in higher education, health care and government. Brian was the Executive Director of openairboston.net (OAB) a non-profit, public/private partnership with a goal of lessening the digital divide through technology literacy programs. As CIO of the Museum of Science, Brian was responsible for Museum-wide information systems strategy. The focus of his work included online learning, mobile applications, and customer relationship management. Brian served as Director of IT at Harvard Business School and led Network Services at Boston College. Brian has a B.A. in Management from Clark University.

## **Leventhal Map Center Staff**

#### Janet H. Spitz, Executive Director

Since 2009, Jan Spitz has served as the Executive Director of the Norman B. Leventhal Map Center at the Boston Public Library. She oversaw the development and opening in October 2011 of the center's new physical space which includes an exhibition gallery, learning center, map storage and offices. She directed the presentation of the exhibition, *Torn in Two: 150<sup>th</sup> Anniversary of the Civil War* in Boston and its national tour. Under her leadership the Leventhal Map Center has implemented a Strategic Plan that includes developing a central web portal for historic maps and a national program for training teachers to use maps in the classroom to teach all subject areas. For over 25 years Jan Spitz has served in leadership positions at educational and cultural institutions in Massachusetts, Ohio and Washington, D.C. She has led strategic initiatives in audience development at the Worcester Art Museum, an international teacher training program at Perkins School for the Blind, and several fundraising campaigns at these two institutions as well as the Museum of Fine Arts and the Wang Center for the Performing Arts. Her service as a Board member includes the Conservatory Lab Charter School, Friday Forum and Women in Development. She has an advanced degree in Art History.

#### Ronald E. Grim, Curator

Ronald E. Grim was appointed Curator of Maps for the Norman B. Leventhal Map Center at the Boston Public Library in January 2005. He assumed this position after working 33 years with the nation's two largest map collections at the National Archives and the Library of Congress. His most recent position was Specialist in Cartographic History in the Geography and Map Division of the Library of Congress, where he served as the Executive Secretary of the Philip Lee Phillips Society. He has curated five Library of Congress exhibitions, including the Library's recent exhibit "Rivers, Edens, Empires: Lewis & Clark and the Revealing of America". In addition, he has been a part-time instructor teaching courses on the historical geography of North America and maps as sources at George Washington University and the University of Maryland, College Park. While at the Library of Congress, he served as the Library's Member and was a past Chair of the U.S. Board on Geographic Names. He is also Book Review Editor of *Imago Mundi*, the international journal for the history of cartography; a member of the Board of Review for the Osher Map Library at the University of Southern Maine, Portland; and a member of the Editorial Advisory Board for *Geoscapes: Journal of Map and Geography Libraries*.

#### Lauren Chen, Cataloger

Lauren Chen is the Cataloger at the Norman B. Leventhal Map Center at the Boston Public Library, where she catalogs materials and maintains the digital collection. She earned her MSI from the University of Michigan Ann Arbor, where she also worked as a Cataloging Assistant at the Map Library/Stephen S. Clark Library.

#### Alison Cody, Development and Program Manager

Alison Cody is the Development and Program Manager for the Leventhal Map Center. In this role she oversees the growing fundraising program at the Map Center and manages its Raiser's Edge database. Prior to joining the Leventhal Map Center in August 2012 Alison served as Director of Private Funding at Northern Essex Community College. Alison has an MBA from the University of Connecticut.

#### **Stephanie Cyr, Assistant Curator**

Stephanie Cyr is the Assistant Curator at the Norman B. Leventhal Map Center. She earned her MLS from Simmons College in 2005 and her BA in Art History from UMass Amherst in 2003. Her primary roles at the Leventhal Map Center are curating gallery exhibitions and overseeing the technical services aspects of the organization. Prior to her appointment as Assistant Curator, she was the Cartographic Materials Cataloger, a position she held since 2007. Stephanie was previously a reference librarian at the Boston Public Library, and a project cataloger at the Massachusetts Historical Society.

#### Michelle LeBlanc, Director of Education

Michelle LeBlanc has worked in the history education field in Boston, MA for over 15 years as a museum educator and as project director for a Teaching American History program that links teachers with historians and scholarly institutions to enrich their teaching. She holds a Master's degree in American History and Public History from Northeastern University.

#### **Evan Thornberry, Cartographic Reference and Preservation Librarian**

Evan is the Cartographic Reference and Preservation Librarian for the Norman B. Leventhal Map Center. Since January of 2012 he has managed the reference and collection maintenance activities at the Center. Previously, Evan spent 3 years as the Map Library Manager at the Huxley College Map Library at Western Washington Library. He earned his MLIS from the University of Washington in 2012, and his B.A. in Geography/Social Sciences from Western Washington University in 2006.

#### **Catherine Wood, Office Manager**

#### **Key Contacts**

Please feel free to contact Janet H. Spitz or Evan Thornberry at any time during the forum.

Janet H. Spitz, jspitz@bpl.org Work: 617.859.2506, Cell: 617.285.3257

Evan Thornberry, ethornberry@bpl.org Work: 617.859.2140, Cell: 815.404.3127

#### **Lunches and Dinner**

Two Lunches and Wednesday night's Dinner will be provided courtesy of the Leventhal Map Center.

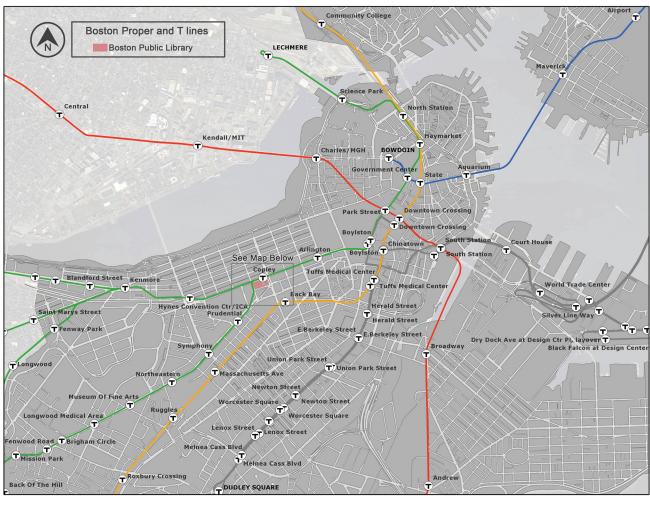
Cocktails Wednesday night will be held at Beacon Capital Partners at 200 State Street, in downtown Boston. Dinner will be steps away at City Landing (<a href="www.citylanding.com">www.citylanding.com</a>). Travel options to this location include:

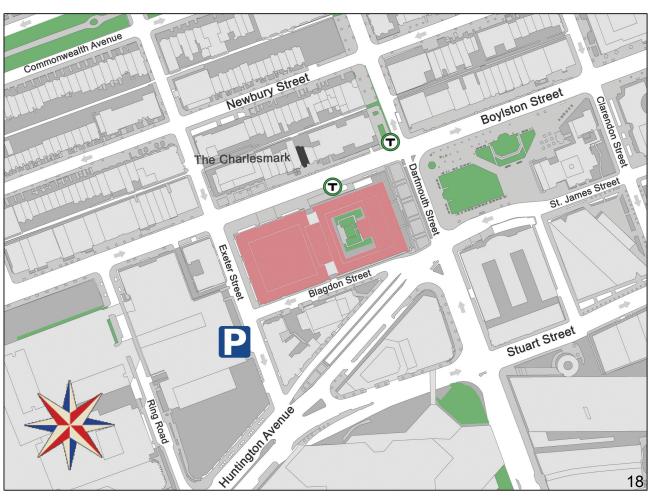
**Drive** from BPL - 15 minutes - parking \$16 @ 75 State Street Garage after 5 p.m.

Taxi from BPL - 15 minutes - estimated one-way fare \$13

**Green Line T** from Copley to Government Center + 5 minute walk - 20 minutes - one-way fare \$2.50

Walk with Evan - 30 minutes - free - 1.5 miles





### **Directions - Boston Public Library**

Boston Public Library is located in historic Copley Square in the Back Bay neighborhood of Boston.

Boston Public Library 700 Boylston Street, Boston, MA 02116

Scan code below for Google Maps location and directions:

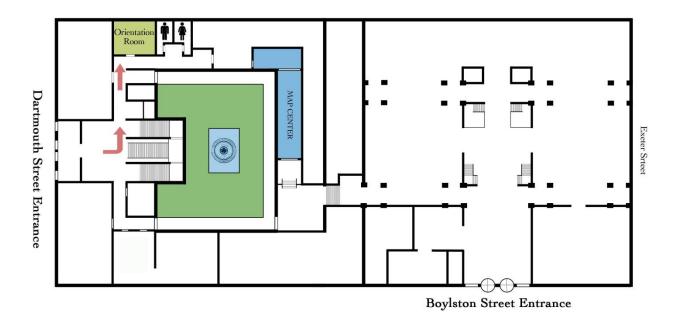


### **Parking**

The Prudential Center / Exeter Street parking garage is the nearest public parking facility to the Library. Follow Exeter Street south past Boylston Street. The garage entrance is located on the right immediately after Blagdon Street (See map on previous page).

#### **Directions - Glass Orientation Room**

The Forum on the American Revolution will be held in the Glass Orientation Room located in the McKim Building of the Boston Public Library. Enter into Dartmouth Street entrance and turn left before going up the staircase. Turn right at the end of the hall. The Orientation Room doors are located on the left.



### **Additionally**

# The Norman B. Leventhal Map Center at the Boston Public Library

and

#### The Boston Map Society

cordially invite you to attend Lecture by Stephen Hornsby

Surveyors of Empire: Samuel Holland, J.F.W. Bes Barres, and the Making of The Atlantic Neptune

Viewing of the exhibition

Charting an Empire: The Atlantic Neptune

Curated by Stephanie Cyr

Thursday, September 12, 2013 5:30 pm, Reception, Commonwealth Salon 6:00 pm, Lecture, Commonwealth Salon 7:00 pm, Gallery Tour, Map Center Gallery

McKim Building (Boylston Street entrance, Ground Floor)
Boston Public Library, Copley Square

R.S.V.P. to Cathy Wood at 617-859-2387 or maps@bpl.org

#### **REVOLUTIONARY WAR ERA (1750-1800) MAP BIBLIOGRAPHIES**

Barker, Thomas M. and Paul R. Huey. *The 1776-1777 Northern Campaigns of the American War for Independence and Their Sequel: Contemporary Maps of Mainly German Origin*. Fleischmanns, NY and Vergennes, VT: Purple Mountain Press and Lake Champlain Maritime Museum, 2010. NBLMC: E232.B37 2010. *Reproduces and describes 42 maps, primarily from German repositories ( Hessisches Staatsarchive Marburg, and Niedersachsisches Landesarchive)* 

The British Library. *The American War of Independence, 1775-83: A Commemorative Exhibition Organized by the Map Library and the Department of Manuscripts of the British Library Reference Division, 4 July to 11 November 1975.* London: Published for The British Library by British Museum

Publications LTD., 1975. *Exhibition catalog of maps and related materials primarily from British Library*.

Brun, Christian. *Guide to the Manuscript Maps in the William L. Clements Library*. Ann Arbor: University of Michigan, 1959. NBLMC:. *Describes 806 manuscript maps in collection, primarily Revolutionary War era. Entries are arranged geographically, with almost 100 entries for Massachusetts*.

Clark, David Sanders. *Index to Maps of the American Revolution in Books and Periodicals Illustrating the Revolutionary War and Other Events of the Period, 1763-1789*. Westport, CT: Greenwood Press, 1974. NBLMC: Z6027.U5C57.

Cumming, William. *British Maps of Colonial America*. The Kenneth Nebenzahl, Jr., Lectures in the History of Cartography. Chicago: University of Chicago Press, 1974. NBLMC: GA405.5.C85.

Cumming, William. *The Colonial Charting of the Massachusetts Coast.* Boston: Colonial Society of Massachusetts, 1980. NBLMC: G1232.C6C86 1980.

Cumming, William. *The Southeast in Early Maps*. 3<sup>rd</sup> ed., rev. and enl. By Louis De Vorsey, Jr. Chapel Hill: University of North Carolina Press, 1996. BPL: GA405.C8 1998. *450 entries, printed and manuscript maps of the Southeast (south of Virginia and north of Florida). Cites 23 institutional collections including Boston Public, Harvard, John Carter Brown, Library of Congress, Clements and Newberry Libraries.* 

Guthorn, Peter J. *American Maps and Map Makers of the Revolution*. Monmouth Beach, NJ: Philip Freneau Press, 1966. NBLMC: Z6026.H6G86 1966. *Entries arranged alphabetically by map makers. No cumulative total of maps listed. Researched a large number of institutions, including Boston Public Library.* 

Guthorn, Peter J. *British Maps of the American Revolution*. Monmouth Beach, NJ: Philip Freneau Press, 1972. NBLMC: GA405.5/G872 1972

Guthorn, Peter J. *United States Coastal Charts, 1783-1861*. Exton, PA: Schiffer Pub., 1984. NBLMC: GA 405.C86 1984. *Reproductions and descriptions arranged geographically. Difficult to isolate pre-1800 charts, although there are biographies of the major pre-1800 chart makers*.

Harley, J.B;.Barbara Bartz Petchenik; and Lawrence W. Towner. *Mapping the American Revolutionary War*. The Kenneth Nebenzahl, Jr., Lectures in the History of Cartography. Chicago: University of Chicago Press, 1978. NBLMC: GA405.5.H37.

McCorkle, Barbara B. *New England in Early Printed Maps, 1513 to 1800: An Illustrated Cartobibliograpy*. Providence, RI: The John Carter Brown Library, 2001. NBLMC: GA408.5.N49M38 2001. *Approximately 325 entries from 1750 to 1800, describing maps of North America, eastern North America, or New England, many of which are illustrated with thumbnail pictures. There are also 90 entries describing individual state maps up to 1800. 46 institutions cited, including Boston Public Library, American Antiquarian Society, several Harvard collections, John Carter Brown (a primary source), Library of Congress, Massachusetts Historical Society.* 

McLaughlin, Patrick D. *Pre-Federal Maps in the National Archives: An Annotated List*. Special List no. 26. Washington, DC: National Archives and Records Service, 1971. RG copy.

Marshall, Douglas W. and Howard H. Peckham. *Campaigns of the American Revolution: An Atlas of Manuscript Maps*. Ann Arbor and Maplewood, NJ: University of Michigan Press, and Hammond, 1976. NBLMC: G1201.S3M25 1976 folio. *Reproduces 58 manuscript maps*. *Reproductions primarily from Clements Library (35), but also from Library of Congress (10), New York Public Library (1), Huntington (1), Cornell University Library (1), British Library (4), and Duke of Northumberland (2). Arranged by year of war, and then by campaign/battle, each chapter introduced with a map showing battle sites.* 

Marshall, Douglas W., ed. *Research Catalog of Maps of America to 1860 in the William L. Clements Library, University of Michigan, Ann Arbor, Michigan*. Boston: G.K. Hall, 1972. NBLMC: Z6027.A5W5 1972.

Nebenzahl, Kenneth. *Atlas of the American Revolution*. Chicago: Rand McNally, 1974. NBLMC: G1201.S3N4 1974. Reproduces 50 maps, along with many other illustrations. Foldout time line with geographical breakdown. *Reproductions primarily from Newberry Library (31), but also Clements (5), Library of Congress (5), New York Historical Society (2), New York Public Library (1), and John Carter Brown (1), as well as several private collections (Ken Nebenzahl, Gen. E.C.R. Lasher, Isadore M. Scott , and Sy Schwartz)* 

Nebenzahl, Kenneth. *Bibliography of Printed Battle Plans of the American Revolution, 1775-1795*. Chicago: University of Chicago Press, 1975. NBLMC: Z6026.H6N33. *218 entries, dated between 1775 and 1795*. Found in 14 collections, including LC, Newberry Library, Clements Library, JCB Library, Mass Historical Society, and American Antiquarian Society.

Pritchard, Margaret Beck and Henry G. Taliaferro. *Degrees of Latitude: Mapping Colonial America*. Williamsburg, Va.: Colonial Williamsburg Foundation in association with H.N. Abrams, 2002. BPL: GA405.P75 2002.

Rice, Howard C., Jr., and Anne S.K. Brown, eds. *The American Campaigns of Rochambeau's Army, 1780, 1781, 1782, 1783*. Princeton, NJ: Princeton University Press, 1972. 2 vols. NBLMC: E265.R513. *See* 

especially Volume 2 (The Itineraries, Maps and Views), which provides a comprehensive atlas of the American campaigns of Rochambeau's Army, many of which are the work of Louis-Alexandre Berthier, whose journal and maps are at Princeton University Library.

Schwartz, Seymour I. *The French and Indian War, 1754-1763: The Imperial Struggle for North America*. Edison, NJ: Castle Books, 1994. NBLMC: NBLMC: E199.S39 1994.

Sellers, John R. and Patricia Molen Van Ee. *Maps and Charts of North America and the West Indies,* 1750-1789. Washington, DC: Library of Congress, 1981. RG: Z6027.N68U54. 2,154 entries. Lists only the holdings of the Library of Congress. Entries are arranged geographically, and then chronologically, although different editions and states are listed with first edition. Many maps from French and Indian War were excluded. LC has digitized many of these maps, starting in the North and working southward. Includes all the Atlantic Neptune charts.

Wheat, James Clements and Christian F. Brun. *Maps and Charts Published in America before 1800: A Bibliography*. New Haven: Yale University Press, 1969. NBLMC: Z6027>A5W68 1969. *915 entries, arranged geographically, covering the entire world, but primary coverage is the original 13 colonies. Each geographical listing is arranged chronologically, with most dated in the last half of the 18<sup>th</sup> century, but some before. Maps located in 65 libraries, including Boston Public Library, Massachusetts State Library, Boston Athenaeum, Harvard University, Massachusetts Historical Society, Essex Institute (Salem), American Antiquarian Society, Worcester Art Museum, Williams College.* 

Any views, findings, conclusions, or recommendations expressed in this packet or during this event, do not necessarily represent those of the National Endowment for the Humanities.

# Key Partners & Progress To Date

Organization	Maps Selected?	Digitized?	Agreement Signed?	On LMC website?
Richard Brown	Yes	Yes	Yes	Yes (271)
Library of Congress	Yes (additional selection to come)	Yes	Yes	Yes (137)
Harvard	Yes	Yes	Yes	Yes (32)
British Library	Yes (372)	Yes	Yes	In progress
Boston Athenaeum	Yes	Yes	Yes	Yes (17)
Clements (UMich)	Yes (440)	Some	Yes	No
New York Public Library	Yes (248)	50% digitized	Yes	Yes (122)
John Carter Brown Library	Yes (366)	100% digitized	In progress	No
American Ant. Society	Yes	Yes	Yes	Yes (137)

# Progress To Date, continued

Organization	Maps Selected?	Digitized?	Agreement signed?	On LMC site?
Newberry Library	Yes (39)	Yes	Yes	In progress
Massachusetts Historical Society	Yes (32)	In progress	Yes	In progress
Colonial Williamsburg	No	Yes	In progress	No

# Timeline for Am. Rev portion

Organization	Target Completion Date		
Harvard Map Collection	June 1, 2014		
New York Public Library	September 1, 2014		
American Antiquarian Society	October 1, 2014		
Boston Athenaeum	December 1, 2014		
British Library	May 1, 2015		
Massachusetts Historical Society	July 1, 2015		
Newberry Library	June 1, 2015		
John Carter Brown Library	December 1, 2015		
Colonial Williamsburg	December 1, 2015		
Library of Congress	December 1, 2015		
Clements Library	December 1, 2015		

### MARC record example

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005		20070413095700.0
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052		\$a 3764 \$b B6
090		\$a G3764.B6:2C38S3 1775 \$b .J44
110	2	\$a Jefferys and Faden, London.
245	12	\$a A sketch of the action between the British forces and the American provincials, on
the he	eights of	the peninsula of Charlestown, the 17th of June 1775 / \$c Engravd by Jefferys & Faden.
255		\$a Scale ca. 1:13,800 \$c (W 71.05°W 71.02°/N 42.23°N 42.21°).
260		\$a London : \$b Jefferys & Faden, \$c 1775.
300		\$a 1 map : \$b col. ; \$c 34 x 31 cm.
500		\$a Hand colored.
500		\$a Relief shown by hachures.
500		\$a Indexed for points of military interest.
520	0	\$a This map and battle plan immortalized what came to be known as the Battle of
Bunke	er Hill. Th	ne alphabetic key identifies British regiments and ships and narrates their actions. The plan
also s	hows ear	rthworks held by the Colonial troops. This detailed plan was published in London only five
days a	fter new	vs of the battle itself reached England. Given the haste with which it was prepared, its
geogr	aphic va	gueness in the rendering of Charlestown is less surprising than its overall accuracy and
detail		
530		\$a Available also through the Norman B. Leventhal Map Center website as a raster
image	<b>!.</b>	
510	4	\$a LC Maps of North America, 1750-1789, \$c 902
590		\$a Leventhal Map Center copy 2 offsite.
650	0	\$a Bunker Hill, Battle of, Boston, Mass., 1775 \$v Maps \$v Early works to 1800.
651	0	\$a Boston (Mass.) \$x History \$y Revolution, 1775-1783 \$v Maps \$v Early works to 1800.
655	0	\$a Maps.
655	0	\$a Digital images.
700	1	\$a Faden, William, \$d 1749-1836.
700	1	\$a Jefferys, Thomas, \$d d. 1771
752		\$a United States \$b Massachusetts \$d Boston (Bunker Hill)

\$u http://maps.bpl.org/id/10070 \$z Click here to see Leventhal Map Center image

#### **COOPERATION AGREEMENT**

This COOPERATION AGREEMENT ("<u>Agreement</u>") dated as of the Effective Date (as defined below) is entered into by and between the Norman B. Leventhal Map Center, Inc., a Massachusetts nonprofit corporation ("<u>LMC</u>"), having its principal office at 700 Boylston Street, Boston, MA 02116, the Boston Public Library ("<u>BPL</u>"), having its principal office at 700 Boylston Street, Boston, MA 02116 and ("<u>Partner</u>"), having its principal office at [PARTNER ADDRESS]. LMC, BPL and Partner are each referred to herein as a "<u>Party</u>" and together, as the "<u>Parties</u>."

WHEREAS, LMC is dedicated to the creative educational use of its cartographic holdings, and in pursuit of this mission, LMC collects and preserves maps and atlases, promotes research in the collection, and makes its resources available to the public through its website, Central Web Portal, exhibitions, publications, lectures, and other programs;

WHEREAS, LMC is the steward of BPL's collection of maps and atlases;

WHEREAS, Partner collects and preserves maps and atlases; and

WHEREAS, LMC and Partner each desire to enhance their digital collections of historic maps and atlases and accord their collections a wider audience as described further herein.

NOW THEREFORE, in consideration of the mutual covenants and agreements contained herein, the each of the Parties agree to the following:

1. <u>Term</u>. Unless terminated earlier by the BPL, LMC or Partner pursuant to Section 9 below, the initial term of this Agreement will commence on the Effective Date and will continue for a period of five (5) years. BPL, LMC and Partner may together extend the term of this Agreement for successive five (5) year periods on the terms contained herein upon the mutual written agreement of the Parties prior to the end of the then existing term.

#### 2. Items.

- 2.1 From time to time, LMC and Partner may each request (the "Requesting Party") by written notice to the other (the "Providing Party") certain maps and atlases from the Providing Party's digital collection that the Requesting Party desires to add to its own digital collection. Following the receipt of such notice, and subject to Section 2.2 below, the Providing Party will deliver a copy of the digital images and associated metadata of such maps and atlases to the Requesting Party in a mutually agreed upon format (e.g., the Tagged Image File Format (TIFF)) (such copy, the "Digital Material").
- 2.2 LMC and Partner each acknowledge that certain maps and atlases whose digital images are made available on the other's website may not be the property of such Party and/or that such Party may not have the right or authority to convey digital images of such maps and atlases.
- 2.3 The Providing Party warrants and represents that the Digital Material is in the public domain. Notwithstanding the foregoing, to the extent that any portion of the Digital Material is not in the public domain and that copyright is held by the Providing Party, the Providing Party hereby grants to the Receiving Party a perpetual, irrevocable, worldwide, non-exclusive, royalty-free, fully paid-up, transferable and sublicenseable license under all of its rights in the Digital Material to reproduce, display, distribute, modify and create derivative works and/or perform such portion of or otherwise use the Digital Material subject to the terms and conditions of this Agreement. If at any time either Party discovers that an error may have been made in the warranties and/or representations regarding the rights being licensed,

both parties will cooperate in good faith to eliminate from the Digital Material those aspects causing the potential breach in the warranties and/or representations.

#### 3. <u>Digitization</u>.

- 3.1 LMC and Partner will each be responsible for digitizing its own materials. If LMC or Partner desires a digital image to a map or atlas that has not been digitized, LMC and Partner will discuss in good faith options to digitize such map or atlas. The Partner may decline to digitize a map for reasons of condition, size, or other curatorial concerns.
- 3.2 Digitization of maps or atlases provided under Section 2.1 above must meet or exceed the standards set forth in "Technical Guidelines for Digitizing Cultural Heritage Materials" by the Federal Agencies Digitization Guidelines Initiative, available online at http://www.digitizationguidelines.gov/.
- **4.** <u>Use of Digitized Collections</u>. Subject to Section 7 below, all digital images provided pursuant to this Agreement may be used by the Requesting Party only to further the Requesting Party's charitable and/or governmental mission-related activities in education, research, web-based products, and exhibitions.
- **5.** <u>Costs.</u> LMC and Partner will each bear the cost of (a) scanning and cataloguing its own collection and (b) posting the other's Digital Material to its own website. Each Party will bear the costs of maintaining and updating its own website.

#### **6.** <u>Intellectual Property</u>.

- 6.1 Nothing in this Agreement transfers ownership of any copyright, patent, or trademark from any Party to another Party or Parties.
- 6.2 Providing Party will not impose further permission, usage, and/or licensing restrictions upon the Digital Material beyond those set forth in this Agreement and in writing by the Providing Party prior to delivery of such Digital Material under Section 2.1 above.
- 6.3 The Providing Party warrants and represents to the Requesting Party that it is able to grant the use of its Digital Material as described in this Agreement, and that the use of the Digital Material as contemplated in this Agreement does not infringe the copyright or any other proprietary or intellectual property rights of any third party.

#### 7. Publicity and Attribution.

7.1 LMC and Partner will develop mutually agreed upon guidelines for marketing and promoting the Digital Material. LMC and Partner must each obtain the written consent of the other prior to any use of the other's logos, name or other trademarks (the "Marks"), including without limitation prior to any use on a website, in print, or in any other media. Partner's written consent must be from its Office of the vice president for global communications (or written designee) or its successor. Once approved, similar uses in the same context and format will not require additional approval. Any use of LMC's Marks will inure to the sole benefit of Partner. If LMC or Partner determines that the other Party is using its Marks in a manner that is or may be detrimental to such Party's interest, then such Party may issue reasonable instructions to the other Party concerning the manner, if any, in which the other Party may continue to use such Marks. Such other Party will promptly comply with such instructions or cease the use or display of such Mark. Except as expressly set forth herein, LMC and Partner each reserve all right, title and interest in and to its Marks.

- 7.2 The Requesting Party will, consistent with industry standards, clearly and conspicuously attribute any Digital Material of the Providing Party used by the Requesting Party under this Agreement, including without limitation the name of the owner of the physical map or atlas that is the subject matter of the applicable Digital Material and information describing the Providing Party from whose collection the Digital Material originated, either in the form of a link to Providing Party's website if the Digital Material is used on a website or a brief informational synopsis.
- **8.** <u>Agency/Authority</u>. Nothing in this Agreement shall be construed to place the Parties in an agency, employment, franchise, joint venture, or partnership relationship. No Party will have the authority to obligate or bind any the other Party in any manner, and nothing herein contained shall give rise or is intended to give rise to any rights of any kind to any third parties. No Party may represent to the contrary that it has the authority to act on behalf of or bind any other Party.

#### 9. Termination.

- 9.1 The BPL, LMC and Partner may each terminate this Agreement (a) without cause by providing ninety (90) days written notice to the other two Parties or (b) if either of the other Parties materially breaches this Agreement and such breach remains uncured for more than thirty (30) days, after the receipt by the breaching Party of written notice specifying the breach and requiring its remedy.
- 9.2 Upon termination, all Digital Material conveyed from the Providing Party to the Requesting Party prior to the termination of this Agreement will be retained by the Receiving Primary Party and will be treated in accordance with the terms and conditions of this Agreement, including Sections 4, 6 and 7 above.
- 9.3 Sections 2.3, 4, 5, 6, 7, 8, 9.2, 9.3, 10 and 11 will survive any expiration or termination of this Agreement.
- 10. <u>Limitation of Liability</u>. UNDER NO CIRCUMSTANCES AND UNDER NO LEGAL THEORY, WHETHER IN TORT, CONTRACT OR OTHERWISE, WILL ANY PARTY BE LIABLE TO ANY OTHER PARTY FOR ANY INDIRECT, SPECIAL, INCIDENTAL, CONSEQUENTIAL OR PUNITIVE DAMAGES OF ANY CHARACTER (INCLUDING, WITHOUT LIMITATION, LOST PROFITS, LOSS OF GOODWILL, LOST OR DAMAGED DATA), EVEN IF A REPRESENTATIVE OF SUCH PARTY HAS BEEN ADVISED, KNEW OR SHOULD HAVE KNOWN OF THE POSSIBILITY OF SUCH DAMAGES.

#### 11. General.

- 11.1 Partner may not assign or transfer this Agreement in whole or in part without the prior written consent of LMC. Any attempted assignment, delegation or transfer by Partner in violation hereof shall be null and void. Subject to the foregoing, this Agreement shall be binding on the parties and their successors and assigns. This Agreement is freely assignable by each of LMC and BPL on condition that the assignee remains bound to fulfill all its terms and conditions.
- 11.2 Amendments or modifications to this Agreement are only valid if they are in writing and signed by all Parties.
- 11.3 Each Party will provide the other Parties with updated contact information should that Party's current address or contact information change. Any notices to be served on any of the Parties by another will be in writing and will be sent by registered or certified United States mail, return receipt requested, or overnight delivery service, or by confirmed facsimile. The date of receipt will be deemed

to be the date of service. The authorized representatives for the parties for receipt of notice are as follows:

(a) For Partner:

[CONTACT INFORMATION AND ADDRESS FOR DESIGNATED INDIVIDUAL]

(b) For LMC:

Jan Spitz, Executive Director Norman B. Leventhal Map Center Boston Public Library 700 Boylston St. Boston, MA 02116

(c) For BPL:

Amy Ryan, President Boston Public Library 700 Boylston St. Boston, MA 02116

- 11.4 If by reason of fire, earthquake, flood, explosion, accident, strike, act of God, war, or other catastrophic event over which any Party has no control, causing any Party to be delayed or prevented from fulfilling its obligations under this Agreement, such delay will be excused during the continuance of and to the extent of such cause, and the period for performance will be extended for a period equal to the duration of such cause. If such delay exceeds ninety (90) days, LMC or Partner may cease performance herein, and this Agreement will be considered terminated.
- 11.5 If any provision or provisions of this Agreement is held to be invalid, illegal, unenforceable or in conflict with governing law, such provision will be reformed only to the extent necessary to make it valid, legal, enforceable and not in conflict with governing law, and the validity, legality and enforceability of the remaining provisions will not in any way be affected or impaired thereby.
- 11.6 Any Party's waiver or failure to require performance by the other of any provision of this Agreement will not affect that Party's full right to require such performance at any subsequent time, or to be taken or held to be a waiver of the provision itself.
- 11.7 This Agreement will be governed by and construed in accordance with the laws of the Commonwealth of Massachusetts without regard to its rules of conflict of laws. Each of the Parties hereby irrevocably and unconditionally consents to submit to the sole and exclusive jurisdiction of courts with subject matter jurisdiction located within the Commonwealth of Massachusetts (the "Courts") for any litigation among the Parties arising out of or relating to this Agreement, or the negotiation, validity or performance of this Agreement, waives any objection to the laying of venue of any such litigation in the Courts and agrees not to plead or claim in any Court that such litigation brought therein has been brought in any inconvenient forum or that there are indispensable parties to such litigation that are not subject to the jurisdiction of the Courts.

- 11.8 This Agreement may be executed in counterparts, each of which will be deemed an original, and such counterparts will together constitute one and the same instrument. For purposes hereof, a facsimile or electronic copy (including a portable data format (PDF) copy) of this Agreement, including the signature pages hereto, will be deemed to be an original.
- 11.9 Subject headings in this Agreement are descriptive only and not meant to define legal rights or responsibilities.
- 11.10 This Agreement constitutes the entire Agreement of the parties and supersedes all prior communications, understandings and agreements relating to the subject matter of this Agreement, whether oral or written.

[Remainder of page intentionally left blank.]

IN WITNESS WHEREOF, THE PARTIES hereto signed this Agreement as of the date last set forth below (the "Effective Date").

#### THE NORMAN B. LEVENTHAL MAP CENTER

By:
Name:
Title:
Date:
THE BOSTON PUBLIC LIBRARY
By:
Name:
Title:
Date:
[PARTNER]
By:
Name:
Title:
Date: